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## Engaging the Community in University Teaching: A Cultural Approach to Sustainability of Effective Learning

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# Losike-Sedimo, N. and Mbongwe, B., University of Botswana, Botswana Engaging the Community in University Teaching: A Cultural Approach to Sustainability of Effective Learning

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## ABSTRACT

This paper revisits levels of education and sustainable development implementation in university teaching. It suggests tapping expertise in local communities as a social responsibility for sustainability of student's human development success. Where success is measured by the students' self-actualization progress. Student success, qualitative growth, or acquired capacities is seen as a prerequisite for sustainable development. We take a reformist point of view of sustainability. We look at issues of human behaviour, cognition and negotiation over preferred futures, under a given social policy and education act. Sustainability here is viewed as an inherently normative concept, rooted in real world problems with very different sets of values and moral judgments. We suggest ways of moving practice, our policies and decision in the direction of sustainability of effective learning, to provide systems of governance that propagate the values that people want to live by. The research design was ethnographic with sample drawn from four corners of the country. The paper reports the result of a study on the influence of culture on cognition and language development. The relevance of the study to sustainability is the findings that those students, whose culture was included in the learning culture, were motivated to learn and had higher academic achievement. The paper presents a view that cultural elements ought to be major aims for future development of education knowledge, skills and fundamental attitude change. Culture should be mandatory for teachers in training if universities aim for effective learning. And the community should therefore be engaged as resource for effective learning.

**Keywords:** Problem – based sustainable development, effective learning through community engagement and successful human development through effective life skills.

## INTRODUCTION

Teaching at any level of education is a challenging complex work. It is a process of imparting knowledge to the learners by the teacher. This process always takes place in a specific culture. Research has demonstrated that there is a connection between teaching expertise and what the students achieve and finally become (Norden and Hnsson, Network learning symposium 2006). However expertise is not equivalent to good teaching. Good teaching is defined differently by different cultures. The question arose about the goal of all the education reforms, presidential commissions and task forces that emphasized school success for all. Is this goal achieved and if not why. If it is achieved how is effective learning sustained. We engaged ethnographic procedures to collect analyse and interpret data. We just followed the data wherever it took us. Our investigation revealed a string of cultural patterns that were a barrier to effective learning. The issues of cultural self concept, worth and fitment in the community became dominant. We then used Maslow's theory of self actualization to understand the relationship between the education worth and the 'who am I culturally'. We suggested that the concept of sustainability or education for sustainable development would be fruitful in two related ways for solving the observed problems. First, it provides a focus for a series of concerns that

relate to the interconnected debates over environmental, social and economic conditions of sustainable development. The observed concerns are important and addressing them directly is a start for progress in student success and overall human development. Second, the debate over the concept and practice of sustainability narrows those concerns in a particularly pointed given way here in termed self-actualization. As this article unfolds we discuss sustainable development in the context of students' human development through the process of self-actualization. We also use examples of how the rest of the world is working toward ESD to strengthen our case.

## **STATEMENT OF THE PROBLEM**

The problem addressed in this paper is the ways and factors that can promote learning effectiveness in universities. It is evident from literature that there is need to find methods that further the argument of multiple levels of implementing sustainable development, and the success of such implementation is measured by effectiveness of learning. The paper explores the possibility of engagement of the community in university teaching in order to address contemporary issues of learning effectiveness.

## **PURPOSE**

The objective of this paper is to focus the lens of Education for sustainable development on the learner's experiences and achievement. By using the results of a culture study which form the basis of the paper's argument, the researchers seek to understand how the community can be engaged to promote quality learning outcomes

## **CONCEPTUAL FRAMEWORK**

Universities and their staff are facing multiple new challenges as societies offer them new roles as drivers for development. They take on educational outreach tasks in greater numbers and with wider ambitions to shape the world we live in. Life-long learning, internationalization, educational flexibility, diversity among target groups, trans-disciplinarily in courses and research efforts, competence development in the work-place, transfer of skills and innovative use of information and communication technologies (ICT) are some of the issues that are of concern. And at the centre of these concerns is the shift from a focus on teachers in isolation in the academy to student's achievements and overall human development. The case in point is, what do students as individuals stand to gain in education for development. First what is education for development, and second how is it applied to the daily activities of classroom learning? The phrase sustainable development has many interpretations. In his review of articles dating as far back as 1987, Robinson (2004) stated that defining sustainable development is like trying to square a circle. He also pointed out that academics and NGOs prefer the term sustainability, to imply ability of humans to continue to live within environmental constraints. He perceived sustainability as an integrative concept, across fields, sectors and scales. The conventional definition of sustainable development derived from the 1987 Brundtland Report is development which meets the needs of the present without compromising the ability of future generations to meet their own needs (WCED, 1987). In practice, sustainable development is an unclear concept, involving multiple approaches and a variety of recommendations as to the ways forward (Williams & Millington, 2004). However three areas can be identified. These are economic growth, environmental degradation, and social issues and concerns for development. The decade of ESD has seen many projects, policies and plans addressing either any of the three elements or their connectedness.

The United Nations' Decade of Education for Sustainable Development was established in December, 2002, through Resolution no. 57/254. This resolution recommends UNESCO to elaborate a plan that would emphasize the role of education in fighting environmental degradation, economic divides, and social problems like poverty and other development concerns for humanity such as the right to education. The decade starts from 2005 and ends in 2015. It further states that it is important to create campaigns, and strategies and measures against unsustainability, by proposing alternative ways that

are humane and user friendly to the physical and social environments. Practice and research has shown that solutions that address only environmental, only social or only economic concerns are radically insufficient. What is needed is a form of transdisciplinary thinking that involves the development of new concepts, methods and tools that are integrative and synthetic, and actively creates a combined effort, (Robinson,2008).If sustainability is to mean anything to humanity, it must act as an integrating concept between the social dimensions, the biophysical dimensions and economic dimension of development. It is the idea of combined effort or synergy that brings the concept of engaging the community in university teaching. In this paper the concern is for effective learning for sustainable development. A question may be posed about who the community is and what would be their role in sustainable development? All sectors of the country population with interest in responsible human economic and ecological development form the community to be engaged. It is clear that governments alone have neither the will nor the capability to accomplish sustainability on their own. The private sector, as the chief engine of economic activity on the planet, and a major source of creativity, innovation and entrepreneurship, must be involved in trying to achieve sustainability. The society as the initiator, actor and end receiver of education for sustainable development cannot achieve the necessary sustainability alone. NGOs, politicians, also need to be engaged to achieve the goals of education for development. This has been echoed and expanded by Robinson (2008) by stating, “-this broad partnership must also involve the active participation of the research and teaching community. In virtually every area of sustainability, more research, and better-trained citizens, are needed. While not every researcher and teacher can or should be focused on these issues, there is a need for the academy to focus its attention more strongly on developing the knowledge, tools and training required to address the challenge of sustainability. It is clear that education for sustainability can never be a one man’s show. All sectors of the community should contribute to a better life for all, the contribution should go beyond technical fixes, scientific clichés, and begin to address profound issues of opportunity, distribution, material needs, consumption, culture, and empowerment. These attributes of development speak directly to the existence and well being of an individual, Freire, (1992; 1997). Literature illustrated that sustainable development is better addressed by seeking to develop individuals in a way that will not harm the earth or the ecosystem (Gadotti, 2008) In this paper the writers take the view that one way of implementing education for sustainability is to empower the students by considering their dreams in the context of their culture, by engaging the community to address profound issues of culture, student achievement and self actualization. Because upon school completion, they will be absorbed by the same community to participate in activities of development Gaddotti, (2008)

## **LEARNING CULTURE AND SUATAINABLE DEVELOPMENT**

Culture is a very influential factor of development in every society. However it is not necessarily a popular topic to some sectors of the community and policy makers and country leaders.

Multiculturalists have advocated greater diversity and representation in the academic community, by increasing members of historically disadvantaged groups among faculty, staff, and students, and recognizing and addressing their distinctive intellectual and socially relevant interests. But it has often been associated with identity politics or advocacy of the interests of minority groups by their members. In both national and local politics, a representation of ideas and persons from varied cultures in specific institutions is a desired goal of multiculturalism. However multiculturalism has been opposed in academia, because it is believed to weaken traditional subject matter by watering down the established subjects and neglecting universal knowledge. This opposition has been largely from conservative white intellectuals. It seems international organizations supports multiple cultures in education. In the foreword of the project report *All Different, All Unique – Young people ... UNESCO Universal Declaration on Cultural Diversity*, Kod’chiro Matsuura, express the following:

‘The cultural diversity around us today is the outcome of thousands of years of human interaction with nature and among people with different customs, beliefs and ways of life ...All cultures are creative and dynamic, but they are also unique, fragile and irreplaceable. A culture neglected for a single

generation can be lost forever. It is therefore crucial to create a safe environment in which all cultures can develop freely.....Through international and intercultural friendship, young people should benefit from cultural diversity, through their actions today, they should help to preserve it for generations to come. Thus, while youth are the key to the future, it is essential that they shape the present too. (UNESCO, 2004, p.4)

The same document stated that the key to sustainable human development is the preservation and promotion of cultural diversity, which the market forces alone cannot guarantee (UNESCO, 2004). 'As a source of exchange and innovation, cultural diversity is as necessary for humankind as biodiversity is for nature.' (UNESCO, 2004, p. 6)

This quotation could be expanded to say cultural diversity mean different customers for ecological, economic, and social development markets. Education for development can therefore take students cultural development into account. Vygotsky (1978) showed the relationship between learning and culture, According to him culture shapes ones' way of thinking and knowing. As such we can claim that all knowledge is situated in some culture and culture is needed to process knowledge.

## **MASLOW'S THEORY OF MOTIVATION AND EDUCATION FOR SUSTAINABLE DEVELOPMENT**

Abraham Maslow developed the Hierarchy of Needs model in 1940-50's in USA, and the Hierarchy of Needs theory remains valid today for understanding human motivation, management training, and personal development. Indeed, Maslow's ideas surrounding the hierarchy of needs are today more relevant than ever. His work and ideas extend far beyond the hierarchy of needs. For example the concept of self-actualization relates directly to the present day challenges and true personal development for employees, by calling for development for life not just for work. The same applies to schools and universities, students need to be taught for life not just for work. The teaching should provide real meaning, purpose and true personal development for the students. The issues of sustainability as outlined in UNESCO literature such as equity, human rights, eradication of poverty, balance between economic activities and preservation of the eco system, issues of the right to good education or to exist in a society, lend themselves in Maslow's concepts of motivation and self actualization. It follows that sustainable success for students or workers, should start with individual development support pointing to a direction of self - actualization

In fact virtually all personal growth, whether in a hobby, a special talent or interest, or a new experience, produces new skills, attributes, behaviours and wisdom that is directly transferable to any sort of work roles As such sustainable success should start with offering development support to staff or students in any direction whatsoever that the person seeks to grow and become more fulfilled.

## **MASLOW'S SELF-ACTUALIZING AND STUDENT LEARNING EFFECTIVENES**

According to Sullivan and Wilds (2001), 'no matter the wording, the most important purpose of an institution of higher education is to educate students' (p. 1). This suggests that the most important aspect of institutional effectiveness is student outcomes. Student achievement relative to the curriculum is of paramount importance to academic effectiveness. While achievement is in itself important, 'effectiveness dictates a broader scope in that it implies improvement in instruction, methodology, or technology based on the interpretation of data (Sullivan & Wilds, 2001, p. 1).' Accrediting agencies expects institutions to assess student outcomes and to make improvements to the curriculum based upon that data. Institutions must be able to document program improvements that have their roots in assessment data (Sullivan & Wilds, 2001). Maslow's concept of self actualization can be interpreted as student success as shown by outcomes. Research has shown that the higher the achievement the more evident that effective learning has occurred (Haan, 2007; Norden, 2006; Hoffmann, 2006 Hunsson and Norden, 2005; Losike-Sedimo, 2008).



## LEARNING OUTCOMES AS CAPABILITIES FOR PARTICIPATION IN SUSTAINABLE DEVELOPMENT

According to Vygotsky learning is not development; however, properly organized learning results in mental development and sets in motion a variety of developmental processes that would be impossible without learning” (Losike-Sedimo, 2004, Vygotsky, 1978). To fully enhance self-actualization and development as expressed by Maslow, education must move from rote learning towards specifically addressing the development needs and aspirations of the individuals, their ability to think and reason, build up self-respect, as well as respect for others, think ahead and plan their future. The importance of such mental power, cognitive, emotional and social abilities, is making its way into education policies and plans, often under the name of life skills. This term appeared early in the field of health promotion where it was recognized that people cannot achieve their fullest health potential unless they are able to take control of what determines their health (WHO, 1986). Life skills were seen as the abilities for adaptive and positive behaviour that enable individuals to deal effectively with the demands and challenges of everyday life.

In Maslow’s development, human beings are placed at the centre of concerns for sustainable development. Sen put it this way, human development is a process of expanding the real freedoms that people enjoy, expressed as their capabilities (Sen, 1999). Using Maslow’s approach, real poverty is identified not only as deprivation of income only, but also as deprivation of capability to avoid or deal with poverty. The role of education as regards the capability approach is multiple and complex. Being educated has been described by Sen as a basic capability (Sen 1992). Education is referred to as foundational to other capabilities as it provides a concrete set of basic learning outcomes, such as the abilities to read and write (Unterhalter, 2002). However, from the point of view of the capability approach, one can also argue that learning that stops at the level of providing only basic reading and writing skills would be insufficient to advance sustainable development and fighting development problems fully (Bakhshi *et al.* 2003, Bakhshi *et al.* 2004, Hoffmann *et al.*, 2005).

In order to truly expand the substantive freedom of people to live the life they value and to enhance their real choices, education needs to take into account the inter-relatedness of teaching, learning, and human development. Through education, children and adolescents need to be assisted in developing abilities that help them think critically and creatively, solve problems, make informed decisions, cope with and manage new situations, and communicate effectively. In other words, education contents, processes, and contexts must be of such quality that it leads to specific learning outcomes in the form of capabilities. Maslow’s theory is in line with the convention of the rights of the child declaring that education of the child needs to be directed to development of the child’s personality, talents and mental and physical abilities to their fullest potential (United Nations General Assembly, 1989). The increasing shift towards such learning outcomes is also found in international education commitments. The World Education Forum in 2000 took the position that education be geared to tapping and developing each individual's potential needs to emphasize the acquisition of skills (UNESCO, 2000a). The same ideals are echoed in the Dakar framework for action which gave a new impetus to the concept of quality in education. Included in its goals were recognized and measurable learning outcomes in literacy, numeracy as well as essential life skills. The latter are thought to be what ultimately positively shape agency, attitudes and behaviour, and have been proposed to be closely linked to capability (Bakhshi *et al.*, 2003, Bakhshi *et al.*, 2004, Hoffmann *et al.*, 2005).

## CAPABILITY AS A LEARNING OUTCOME OF LIFE SKILLS EDUCATION

The Report to UNESCO of the International Commission on Education for the Twenty-first Century (Delors *et al.*, 1996), stressed the importance of enhancing “inner capacities” in order to meet the challenges of education. It proposed a framework for teaching, learning and human development consisting of four pillars of learning. Namely;

- Learning to know - the understanding and use of knowledge. Related abilities include critical thinking, problem solving and decision-making life skills which are fundamental to informed action.
- Learning to be concerns the concept of agency. Related abilities include life skills for coping, self-awareness, esteem, and confidence, aiming at building an identity, valuing oneself, setting goals, etc.
- Learning to live together implies feeling affiliated to a group, a category, a society and a culture, and understanding and respecting differences. Related inter-personal abilities include communication, negotiation and refusal life skills etc. essential to define a person as a social being, in constant interaction with the world.
- Learning to do is linked to the mastering of cultural tools, i.e. objects or patterns of behaviour, in order to act. The related abilities are linked to the practical application of what is learned, and need to be associated with life skills in a teaching learning situation.

(UNESCO, 1996)

Capability as a learning outcome can simply be termed as acquired functioning or high quality learning outcomes. This view explains what Maslow terms self-actualization. This is supported by a variety of educational, behavioural and developmental theories. For example; the reality for each person is defined by him or herself and seeing oneself as the main actor in defining a positive outcome, Bandura, 1977, Vygotsky, 1978). The first three pillars of learning, express the ideals of sustainable development by educational outcomes that help students to understand themselves and future challenges. While the learning to do is linked to what actions a person takes; it is learning skills for immediate needs and day to day functioning. It also represents an achievement linked to “refined” functionings. These functionings should also secure the learner a specific future. Hence life skill education should produce fully functioning citizens.

## **LIFE SKILLS AS THE BASIS FOR EDUCATION FOR SUSTAINABLE DEVELOPMENT**

Life skills can be closely linked to the notion of capability, and has also been proposed as being part of the underlying principles for education for sustainable development (Hoffmann *et al.*, 2005). The notions of the capability approach and of life skills are also being expressed in new global and regional strategies. The United Nations Economic Commission for Europe (UNECE) Strategy for Education for Sustainable Development (ESD), expresses the vision that ESD should ‘equip people with knowledge of and skills in sustainable development, making them more competent and confident and increasing their opportunities for acting for a healthy and productive life in harmony with nature and with concern for social values, gender equity and cultural diversity’ (United Nations, 2005).

Education for sustainable human development must be an education that aims to help people of all ages better understand the world in which they live, and better act on this understanding. It needs to address the complexity and interconnectedness of problems such as poverty, consumption, environmental degradation, health and population issues including HIV/AIDS, conflict and violation of human rights, etc. It needs to address these topics not only by providing information, but also the abilities needed to understand and use this information, to establish agency and attitudes supporting behaviour that leads to sustainable development (UNESCO, 2005, United Nations, 2005). For instance Botswana as a country that relies on beef industry, wild life tourism and diamond mining for its economy, she needs to equip the students with capabilities to deal with the realities of economic development in harmony with nature. The students need capabilities to understand and act upon; sustainable development in terms of: consumption, environmental degradation, and health and population issue, HIV/AIDS ,poverty, conflict, violation of rights, equity, culture diversity etc. The miners should have the capacity to mine and conserve the environment as well as preserve minerals for coming generations. As well as the ability to transfer skills and adapt to new environmental changes as in when the diamonds are finished. The cattle and tourism industry have to make profit

while preserving both wild and domestic animals for future generations. Both mining and animal industry should guard against overdeveloping the land. All activities should respect the culture of the people. For all that to happen, ESD must be a capability/life skill building process. It must be a means to fulfilling/self-actualization process with products that are fully functioning in the society and are partners in sustainable development

## **IMPACT OF THE CAPABILITY APPROACH ON EDUCATION POLICIES**

An education which addresses the needs of the present generation while building the skills of future generations can be considered sustainable in its approach and in line with the concept of sustainable development. However, it needs to be driven and coordinated by national policy. A shift towards sustainable human development, including the notions of the capability approach is already influencing national education policies. As a follow-up to the World Education Forum in 2000, a number of countries have developed national Education For All (EFA) action plans integrating skill or capacity building. In a UNESCO survey of EFA National Action Plans, 75 countries out of 78 countries reported having included life skills. For example in the SADEC region Botswana, South Africa, Zambia, Namibia, Lesotho have integrated capacity building in the education policy and plans (Hoffmann, 2006) Botswana, and other members in the whole region, their integration is HIV/Aids driven (Botswana Ministry of education, 1998).

## **RESEARCH DESIGN**

The study used both qualitative and quantitative techniques. This design offers opportunities to study phenomena in its natural setting (Creswell, 2004, Jankie, 2001; Dyer, 1999; Bogdan & Biklen, 1998; Denzin and Lincoln, 1998). In this study cultural practices were studied in their naturally occurring social contexts. The researchers described the experiences of the participants guided by theories of child development domains. They made observations conducted interviews and analysed student's achievement records. The research team engaged ethnographic techniques of data collection to describe and interpret the complexities and multiple meanings of observed cultural activities. These cultural activities were studied at home and at school contexts. Ethnographic techniques allowed us to make detailed descriptions of particular social contexts, documented and analysed them as a means of understanding a group's culture. (Denzin & Lincoln, 1998; Spradley, 1979). The study adopted the interpretive perspective of ethnography by providing rich descriptions of studied aspects of culture. Student achievement score were analysed and summarized using SPSS.

### **Population and Sample Selection**

Children aged between 15 and 19 years in Botswana secondary schools formed the population. Purposive sampling was used by selecting individuals and settings that best suites the goals of the study. For example language was used as a variable for culture diversity. Twenty languages were identified and villages that used those languages were selected.

### **Participants**

The participants were selected children from all corners of Botswana aged 15-19years. A total of 350 children falling under different ages, grades were observed, interviewed, and studied using other forms of data collection methods, such as documents, meetings with teachers and parents, interviews with peers and focus group method. Specific demographics of the children were summarized in a table. For lack of space it is not included here but relevant information is included in discussions.

## **Research Questions**

1. What is Botswana culture?



2. What aspects of children's daily functioning are a portrayal of culture?
3. How does culture facilitate the processes of cognition and learning?
4. What are the influences that can benefit education for sustainable development and other aspects of human development?

## **Instrumentation**

Self reports, Interview guides and non participant observation guidelines, document analysis sheets, Focus group scripts (open ended questionnaires for teachers and family or parental, peers meetings), video and digital recorders.

## **Procedure**

Prior to the commencement of the study the team settled issues of permission, gaining access, informed consent and the use of human subjects. The study commenced during the winter break Of 2006 and continued through the fall term of 2008. The team members and tasks were specified for studying cultural activities linked to cognitive development. The emphasis was on describing aspects of Setswana culture that influence cognition and learning within nested structures of Botswana's social and physical environments of school and home. For example, observing culturally accepted behaviours, the intellectual steps needed to exhibit those behaviours, how those behaviours were rewarded, and imitation of correct behaviours during social interactions, doing a task analysis to identify the steps a child goes through to exhibit behaviour social and communication skills. The team recorded both verbal, non verbal communication and observable behaviours on video and digital recorders. In the evening members sat in a conference to reflect closely, analyse; and correct notes as they viewed and listened to tapes and watched videos.

## **Analysis**

Data analysis started on the onset of field work. There was a continuum between data collection, data description, and data interpretation (Kvale, 1996). As data were analysed avenues for identifying any gaps in the data lead to further inquiry and improvement of the interview guide. Quantitative data was analysed alongside qualitative one.

## **RESULTS AND DISCUSSION**

In this study, lack of motivation and sustainability of good learning, retention rate of students was associated with the learning culture clashing with those of the students, the teachers, the curriculum, and the school. The majority of the students whose culture varied from the mainstream culture did not learn as much and achieve as much as those whose culture is included in the school curriculum and teaching methods. The same children did not see the worth of education other than meeting friends and provision of good lunch every day. The following section presents the results for each research question These finding are related very well with the value and role of culture as stated in the in Bakhshi *et al.* 2003, Bakhshi *et al.* 2004, Hoffmann *et al.*, 2005 that states, in order to fully expand the substantive freedom of people to live the life they value and to enhance their real choices, education needs to take into account the inter-relatedness of teaching, learning, and human development

## **What is Botswana Culture?**

Botswana is a landlocked country in southern Africa. It shares borders with Republic of South Africa (RSA) in the south and east, Zimbabwe and Zambia in the north, and Namibia in the west. It is approximately 581730 square kilometres in area (Botswana Official Handbook, 1985). The researchers travelled 1125 kilometres from the extreme south to the extreme north and 970 kilometres across the widest part. The people are called Batswana and the national language is called Setswana.

The researchers' expectations were that as a country Botswana will have a culture. The following findings revealed otherwise.

### **Demographic Background**

Botswana is inhabited by people of predominantly Tswana origin whose history is traced back to the 14<sup>th</sup> century at a place now known as Magalisberg Mountains in Transvaal. (RSA). Besides the Tswana group there are many ethnic groups that constitute an important section of the population. In relation to the Tswana group, they are the minority but important in terms of culture diversity. Among these groups are Bakalaka who speak Ikalanga, the language is closely related to Shona languages of Karanga, Zezuru, and Shankwe. Other minority groups were Bayei, Bambukushu, Basubiya, these tribes were said to originate from Central Africa, and occupy land around the Delta panhandle and their culture have been affected by the proximity to Angola. In this area the researchers used an interpreter. There were also Baherero, who are in three groups, Basarwa who had 13 groups/dialects, Bakgalagadi who had 5 groups, Bazezuru, Basweu, (All people of European origin) occupied the remote west next to the desert, Baindia (Indian origin), Babirwa, Batswapong, Bakoba and a group that called itself the river people are among the minority. The minority groups have kept their cultures through centuries and are important contributors to mainstream Setswana culture.

### **Characteristics of Setswana Culture**

Botswana is a multicultural country, with many regions that are less exposed to the culture of the majority ethnic groups. Setswana can be read, written and spoken by both the minority and the majority groups, but it is a second or third language to some nationals living in remote areas away from the capital city Gaborone. Besides multilingualism, peace, harmony, tribal and racial tolerance all encompassed in Setswana words, KAGISANO, BOTHO which has no English equivalent, literally meaning being human, peace, harmony, democracy and tendencies for collective identity, collective survival, respect for leaders, and self reliance perpetuated by social transmission of traditional knowledge and skills. Even though different regions display unique cultures, these characteristics run through the country.

### **What aspects of children's' daily functioning are a portrayal of culture?**

A typical day of secondary school students starts with chores in the home which ends with living for school. These chores are cultural. They are determined by the age and developmental stage of the child. At school there are two areas where culture manifests itself. Students process subject matter by first translating it to their languages and applying concepts to the lives. In sports and break time they play cultural games and communicate in their mother tongue. The school also serves traditional food. The students experience conflict between their social roles, goals and education tasks and goals. The school structures and environment presents the academic world within the context of a foreign culture. Even subjects where there is natural leeway for cultural inclusion such as language lessons, History lessons and social studies, teachers still miss those opportunities by strictly adhering to the culture of the textbook. Even the classroom communication lacks the basic courtesy that comes with the natural social interactions of the home settings. When the students get home at the end of school day they have to change into who they are culturally. According to the students' self reports this conflict interferes with their studies and self concepts. Students become demotivated and frustrated by the difference in the way they learn at home and the way they learn at school.

### **How does culture facilitate the processes of cognition and learning?**

Theoretically cultural experiences should be a stepping stone for information processing and learning in the classroom. What we observed was the opposite of what we learned from literature reviews and theory (Piaget, 1952; Vygotsky, 1978; DeVries, 1997; Gaskins 1999, Losike-Sedimo, 2004, Berk, 2004; Losike –Sedimo 2007). Instead the students' cultural experiences were hindrances. For example

just cultural identity itself spelled social inequalities. Certain tribes who were inherently poor, who were demotivated, were labelled as not caring for education as they were hunters, gatherers, and fisher boys and girls. The school subjects deskilled and delearned students' cultural knowledge and replaced them with foreign ones. Students reported hating certain subjects and teachers because they could not relate with what was taught. Teacher's interviews, meetings, and focus group discussion revealed that teachers are aware of the culture clashes and exclusions but they did not know how to correct that what is wrong. At home the parents complained about the changes that come with education. Their children were losing good manners and the concept of BOTHO.

### **What are the influences that can benefit education for sustainable development and other aspects of human development?**

There was impressive community participation in schools. Some schools were built by local communities as village projects. There was excellent membership for PTA. Members of the community were engaged in cooking traditional meals for the students. Educators can benefit more by engaging local communities to inject culture in their subject teaching. Not just in subjects like art and craft but every subject can be contextualized professionally to meet the expectations of the students and the community they live in. (Wiest, 2002). In classes where the students' culture and ways of knowing were incorporated, there was higher motivation to learn and higher achievement. This was in line with previous research in the country (Chilisa, 1987; Arthur 1998; Jankie, 2001; Losike-Sedimo 2008) It seemed there was a ripple effect. Children doing well at school had wide and strong support at home. Families looked upon their succeeding children as their hope for the future. Looking at the workforce, it appears the same pattern of who gets ahead is that those who made it in education became more employable and more mobile on the social and economic ladder. The schools could rethink issues of access, equity, and multiculturalism by building on the positive ripple effect of culture and learning stated above, by creating a strong involvement of all students' parents in the education of their children

## **SUMMARY AND CONCLUSION**

### **Engaging the Community in the Transference of Life Skills/Capacity for Effective Learning**

While private and rich schools in the country are struggling with problems of drugs, alcohol and substance abuse, the majority of public secondary students are grappling with different kinds of social problems rooted in the conflict of who they are at home and at school. There was a contradiction existing between who the student is at home and in the street and who the student becomes at school. This resulted in student confusion, low motivation and low achievement.

The Report to UNESCO of the International Commission on Education for the Twenty-first Century (Delors *et al.*, 1996), stressed the importance of enhancing "inner capacities" in order to meet the challenges of education. That implies learning that is linked to the mastering of cultural tools, i.e. objects or patterns of behaviour, in order to function in ones' society. Research on incorporating students' ways of learning in teaching methods observed that student motivation, achievement, and attitude improved with the incorporation of their culture in teaching methods. (Ginter, Brown, Scalies and Ripley, 1989; Drysdal, 1997; Yoder, 1994) Students cultural knowledge is described by (Vygotsky, 1978) as consisting of unique ways of knowing, or acquiring information and therefore a necessary tool for learning (Newman, 2006). To exclude the student culture, is to de-learn, de-skill, and degrade, and kill their self-worth. (Gadotti, 2008, Haan, 2007, Higgitt, Haigh and Chalkley, 2005, Freire, 1992, 1997, Vygotsky, 1978). According to Maslow's theory these effects are a road map to lack of motivation and self-actualization. Research in Botswana has shown that affected students never make it to the top (Chilisa, 1987 Bigale and Monau, 1995, Kann and Mapolelo, 1989, Nyathi – Ramhobo, 1990, Arthur, 1998, Losike-sedimo, 1996, 2007, 2008. As a way of helping the teachers to deal with cultural barriers university can engage the community in its teacher training to inject the

transfer of life skills in the programs. After training the teacher would have the know how for involving the community. Reviewed literature revealed success and advantages of community involvement. The involvement of the community can take the route of education for sustainable development, first by building student worth and enhancing self-actualization and second by using local communities to reconcile the school learning culture with the societal culture. Such efforts would encourage complete function of the student, which will afford her or him participation in education for sustainable development (Hoffman, 2006; Mtsuura, 2004). Sustainability itself should start with effective learning judged by students' success or outcomes (Sullivan & Wilds, 2001).

## REFERENCES

- Arthur, J. (1998). Institutional practices and the cultural construction of primary school teaching in Botswana. *Comparative education*, 34(3), 313-32
- Barkshi, P., Hoffmann, A.M., Van Ravens, J. (2004), Monitoring EFA from a Capabilities' perspective: A life skills approach to quality education. Paper presented at the 4th Conference of the Capability Approach, Pavia.
- Bandura, A. (1977), *Social Learning Theory*, Prentice Hall, Englewood Cliffs, NJ.
- Berk, I.E. (2004), *Development through the life span*. (3<sup>rd</sup> Ed.). Boston: Allyn and Bacon
- Boler, T. and Aggleton, P. (2004). *Life skills-based education for HIV prevention: a critical analysis*, UK working group on education and HIV/AIDS, London.
- Botswana Ministry of Education (1998). *Ministry of Education Policy on HIV/AIDS Education*.
- Carter-Smith, Karin, B. (2008). *Institutional Effectiveness in Higher Education. Research Starters Education: Institutional Effectiveness in Higher Education*.
- Chilisa, B. (1987) *Who gets ahead in Education. A cross-sectional survey of primary, secondary and university students from Mochudi*. Unpublished M.Ed. dissertation. University of Botswana.
- Cole, M. (1996). *Cultural Psychology*. Cambridge, MA: Harvard University Press.
- Delores, J. et al. (1996). *Report to UNESCO on Education for the 21<sup>st</sup> Century – Learning: The Treasure Within*, UNESCO, Paris.
- Denzin, N.K., & Lincoln, Y.S. (1998). *The Landscape of Qualitative Research*. Thousand Oaks, CA: Sage.
- Education for Kagisano (1997). Botswana Government Press.
- Freire, P. (1992). *Pedagogy of Hope. A Re-encounter with Pedagogy of the Oppressed* Sao Paulo: Paz e Terra.
- Freire, P. (1997). *Pedagogy of Autonomy*. Sao Paulo: Paz e Terra.
- Fuller, B. & Snyder, C. (1991). Vocal teachers, silent pupil? Life in Botswana classrooms. *Comparative Education Review*, 35.274-279.
- Gadotti, M. (2008). Education for Sustainability. A critical contribution to the decade of Education for sustainable development. *Green Theory & Praxis: The Journal of Ecopedagogy* 4, (1).

Haan, G. (2007). Education for sustainable development. A new field of learning and action. UNESCO Today. Journal of the German Commission for UNESCO.

Higgitt, D., Haigh, M., & Chalkley (2005). Towards the UN decade for sustainable development. The Journal of Geography in Higher Education. 29, (1) pp 13-17.

Hoffmann, A.M., (2006). The Capability Approach and Education Strategies for Effective Life Skills.

Hoffmann, A.M., and Bory-Adams, A. (2005). The Human Capability Approach and Education for Sustainable Development: Making the Abstract Real. Paper presented at the 5<sup>th</sup> Conference on the Capability Approach, Paris.

Jankie, D. Rethinking Setswana Literary Practices: Towards incorporating community-based and students' experiences in senior secondary classrooms. (2001). Unpublished doctoral dissertation.

Jessor, R. & Jessor, S. (1977). Problem Behaviour and Psychosocial Development: A longitudinal Study of Youth. Academic Press, New York.

John, M., Dambe, M., Polhemus, S., & John, F. (1983). Children's Thinking in Borswana. Boleswa Educational Research Journal. 2(1), 5-17.

Kann, U., Mapolelo, W., & Nleya, P. (1989). The Missing Children. Gaborone: NIR – National Institute of Research.

Losike-Sedimo, N.C., (2008). Social Problems and Learning in Multicultural Botswana Secondary Schools. A Case for Critical Methods. Paper presented at Crossroads Conference at University of West Indies, Kingston on 3-7 July 2008.

Losike-Sedimo, N.C., Mbongwe, B., & Kote, M. (2007). Cultural Influence on Different Domains of Child Development in Botswana. A paper presented to the Department of Educational Foundations Seminar. Gaborone. University of Botswana.

Losike-Sedimo, N.C., (2004). Telepresence Teaching and e-Learning. A Challenge for Sustainability. Proceedings of the Educational Conference 2004, University of Khon Kaen – Thailand. Book of Proceedings (pp 23-35).

Losike-Sedimo, N.C., (1996). Cognitive Development and Child Rearing Practices in Botswana – A Challenge for Quality Education. The Journal of Special Education Research Review, 1(1).

Newman, L. (2006). Change, uncertainty and futures of sustainable development. Futures, Volume 38, Issue 5, June 2006, Pages 633-637.

Nussbaum, M.C. (2000). Women and Human Development: the Capabilities Approach. The Press Syndicate of the University of Cambridge, Cambridge.

O'Donnell, L., Steve, A., San Doval, A., et al. (1998). Violence Prevention and Young Adolescents' Participation in Community Youth Service. Journal of Adolescent Health, 24 (1), 28-37.

Presidential Task Force. (1997). Vision 2016: A Long Term Vision for Botswana. Gaborone: Botswana Government Printers.

Nyathi-Ramahobo, L. (1992). The Girl Child in Botswana. Gaborone: UNICEF.



Robinson, J. (2004). Squaring the Circle? Some Thoughts on the Idea of Sustainable Development. Available at <http://www.sciencedirect.com/science>.

Robinson, J. (2008). Sustainable Development. Available at <http://www.sciencedirect.com/science>.

Sen, A.K. (1992). *Inequality Re-Examined*. Clarendon Press, Oxford.

Sen, A.K. (1999). *Development as Freedom*. Oxford University Press, Oxford.

South Africa Department of Education (1999). *National Policy on HIV/AIDS*.

Sullivan and Wilds (2001). Institutional Effectiveness: More than Measuring Objectives, More than Student Assessment. *Assessment Update*. 13 (5), 4. Retrieved September 19<sup>th</sup> 2008 from EBSCO on-line database.

Sussman, S., Dent, C.W., Stacy, A.W., Sun, P., Craig, S., Simon, T.R., Burton, D., & Flay, B. (1993). Project Towards No Tobacco Use: 1-Year Behaviour Outcomes. *American Journal of Public Health*, 83, 1245-1250.

UNDP (1990). *Human Development Report*. Oxford University Press, New York.

UNESCO (2000a). *The Dakar Framework for Action*. UNESCO, Paris.

UNESCO (2000b). *EFA 2000 Assessment: Thematic Study on School Health and Nutrition*. UNESCO, Paris.

UNESCO (2004a). *Survey Report Update on Planning and Implementing Education for all*. UNESCO, Paris.

UNESCO (2004b). *Report on the Education Sector: Global HIV/AIDS Readiness Survey*. UNESCO/IIEP, Paris.

UNESCO (2005). *Report by the Director-General on the United Nations Decade of Education for Sustainable Development: International Implementation Scheme and UNESCO's Contribution to the Implementation of the Decade*. (172 EX/11). UNESCO, Paris.

United Nations (2005). *UNECE Strategy for Education for Sustainable Development*. (CEP/AC.13/2005/3/Rev. 1). United Nations and New York.

United Nations General Assembly (1989). *Convention on the Rights of the Child*. United Nations and New York.

Unterhalter, E. (2002). The Capabilities Approach and Gendered Education: An Examination of South African Complexities. *Theory and Research in Education*. 1, 7-22.

Schapiro (1969). *Mekgwa le melao ya Setswana*. Cape Town, Longman.

Vygotsky, L.S. (1978). *Mind in Society*. Harvard UP, Cambridge.

Weisen, R.B., Lee, J., & Pellaux, D. (1995). *Life Skills Education as a Component of a Comprehensive School Health Program*. WHO, Geneva.

World Health Organization (WHO) (2004). *Skills for Health*. WHO, Geneva.